

REMARKS

Claims 1-3, 6, 7, and 38 will be pending and under consideration in the instant office action. Claims 4, 5, and 8-37 have been canceled without prejudice to Applicants' right to prosecute the subject matter encompassed by these claims in a related, co-pending application. Claims 1, 6, 7, and 38 have been amended. Support for these amendments is identified in the following remarks. No new matter has been added by these amendments.

Claim Objections

Claim 6 stands objected to because of the following alleged informalities: Claim 6 as previously amended depends from claim 39. The Examiner has noted that there is no claim numbered 39. As such, the Examiner interpreted claim 6 as though it depends from claim 38.

Applicants respectfully acknowledge the Examiner's notification regarding the claim numbering. Claim 6 has been amended to be dependent from claim 38.

Further, the Examiner alleges that this application contains claims 6, 7, and 38, which encompass an invention non-elected with traverse in the election dated May 15, 2006. The Examiner asserts that a complete reply to the final rejection must include removal of non-elected subject matter from the claims or other appropriate action. According to the Examiner, claim 38 has been examined as it reads on the elected invention wherein the mutant p27 gene is located at the endogenous p27 locus resulting in a loss of endogenous, wild-type p27. The Examiner has further noted that the claim fails to recite the term "isolated," thus the claim reads on a cell *in vivo*, which is a murine animal, which is non-elected subject matter. According to the Examiner, if claim 38 is amended to read on the elected invention, claims 6 and 7 will be of the same scope as claim 38.

While Applicants do not agree with nor acquiesce to the Examiner's objections, to further expedite prosecution of the certain subject matter disclosed and claimed in the application, claims 6, 7, and 38 have been amended to include the term "isolated." Support for

these amendments can be found generally, for example, in the as filed specification at page 10, line 12 through page 20, line 29.

Further, Applicants do not agree with the Examiner's assertion regarding claim 6 and 7 being of the same scope as an amended claim 38. In order to further expedite prosecution of the claims, Applicants have amended claims 6 and 7 to more clearly distinguish the subject matter of the claims. As currently amended claims 6 and 7 are not believed to be of equal or the same scope as currently amended claim 38; thus, the issue is now rendered moot. Claim 6 has been amended to recite: "The isolated transgenic mouse cell of claim 38, wherein the cell is a somatic cell, a germ cell, or embryonic stem cell." Claim 7 currently reads, "The isolated transgenic mouse cell of claim 6, wherein the germ cell is an oocyte, primordial germ cell, fertilized egg, sperm cell or spermatocyte." Support for these amendments can be found, for example, on page 18, lines 15 through 22 of the specification.

In view of the above amendments and remarks, Applicants respectfully request that the Examiner reconsider and withdraw the objection to claims 6, 7, and 38.

Rejections Under 35 U.S.C. § 112:

Applicants acknowledge that the Examiner has withdrawn the prior rejection under 35 U.S.C. § 112, first paragraph, as it relates to claims 1-3.

Claims 6 and 7 remain rejected and claim 38 stands rejected under 35 U.S.C. § 112, first paragraph, because the Examiner alleges the specification, while being enabling for 1) an isolated transgenic somatic cell or ES cell or 2) an isolated transgenic mouse primordial germ cell, oocyte, egg, spermatocyte, sperm cell, fertilized egg, zygote, each having a mutant p27 gene lacking a Cdk2 phosphorylation site located at the endogenous p27^{Kip1} locus, wherein the mutant p27 gene encodes a mutant p27^{Kip1} polypeptide having a longer half-life in S phase than wild-type p27^{Kip1} polypeptide, does not reasonably provide enablement for a non-mouse primordial germ cell, oocyte, egg, spermatocyte, sperm cell, fertilized egg, or zygote as claimed. The Examiner believes that the specification does not enable any person skilled in the art to which it

pertains, or with which it is most nearly connected, to make and/or use the invention commensurate in scope with these claims. The Examiner has maintained the rejection as it relates to claims 6, 7, and 38 for reasons of record set forth at pages 3-6 of the office action dated June 21, 2006 and alleges that while Applicant has amended the claims to limit them to murine species, murine species includes species of animal other than mouse, including rat.

Applicants do not agree with nor acquiesce to the Examiner's rejections of claims 6, 7 and 38, but, to further expedite prosecution of the certain subject matter disclosed and claimed in the application, claims 6, 7, and 38 have been amended to recite transgenic mouse cells. Support for these amendments can be found in the specification, for example, at page 34, line 38 through page 40, line 21. Accordingly, Applicants respectfully request that the Examiner reconsider and withdraw the rejection in view of the above amendments and remarks.

Claims 1-3, 6, 7 and 38 stand rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter that Applicant regards as the invention. The Examiner alleges that claims 1 and 38 are unclear because they recite that the cell has a mutant endogenous p27 gene. The Examiner asserts that it is not clear if Applicants intend to encompass a naturally occurring mutation at the endogenous p27 gene, which is what one of skill in the art would interpret by the use of the term "endogenous". According to the Examiner, this is not what is taught by the specification. The Examiner believes that the specification teaches replacement of the endogenous wild-type p27 gene with an exogenous mutant p27^{Kip1} gene. The Examiner further suggests that language such as "...having a mutant p27^{Kip1} gene lacking a Cdk2 phosphorylation site replacing the endogenous Kip1 locus such that there is a loss of endogenous, wild-type p27 activity..." would be more clear. The Examiner, also, asserts that claims 2-3 depend from claim 1 and claims 6 and 7 are read as though they depend from claim 38 (see objection to claim 6, above).

Applicants do not agree with nor acquiesce to the Examiner's rejections. But, to further expedite prosecution of the certain subject matter disclosed and claimed in the

application, claims 1 and 38 have been amended to both read in-part "cell having a mutant p27^{Kip1} gene lacking a Cdk2 phosphorylation site replacing the endogenous Kip1 locus such that there is a loss of endogenous wildtype p27^{Kip1} activity, wherein the mutant p27^{Kip1} gene encodes a mutant p27^{Kip1} polypeptide having a longer half-life in S phase than wild-type p27^{Kip1} polypeptide." Support for these amendments can be found, for example, in the specification at page 19, lines 11-20 and generally at page page 34, line 38 through page 40, line 21. Applicants further submit that the Examiner's assertion regarding dependency of claims 6 and 7 is now rendered moot in view of the current amendments. Accordingly, Applicants respectfully request that the rejection of claims 1-3, 6, 7, and 38 be reconsidered by the Examiner and withdrawn.

Applicants acknowledge that Sheaff *et al.* (1997) and Morimoto *et al.* (2000) have been consider by the Examiner and have been deemed not to read on the elected invention and have not been applied over the claims as examined.

CONCLUSION

In view of the foregoing, Applicants believe all claims now pending in this Application are in condition for allowance and an action to that end is respectfully requested. If the Examiner believes a telephone conference would expedite prosecution of this application, please telephone the undersigned at 206-467-9600.

Respectfully submitted,

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